

(57) Abstract

Method and apparatus of producing polymers in a gas phase polymerization reactor, which has an elongated reactor body, and an essentially vertically disposed central axis.

- 5 The reactor comprises an upper part and a lower part, which are separated by a distribution plate, which promotes distribution into the fluidized bed of monomers flowing from the lower part into the upper part. According to the invention, at least a part of the gas stream fed into the lower part of the reactor is conducted along the inside of the reactor walls past the distribution plate to prevent the formation of stagnant zones in the fluidized bed at the
- 10 reactor walls in the vicinity of the distribution plate.